Internet and Hotline Resources:

Credible Immunization Information for Health Professionals and Their Patients

From the National Network for Immunization Information (NNii)

NNii is a partnership of

- The Infectious Diseases Society of America (IDSA)
- The Pediatric Infectious Diseases Society (PIDS)
- The American Academy of Pediatrics (AAP)
- The American Nurses Association (ANA)
- The American Academy of Family Physicians (AAFP)
- The National Association of Pediatric Nurse Practitioners (NAPNAP)
- The American College of Obstetricians and Gynecologists (ACOG)

For scientifically credible sources of information about immunization and specific vaccines, the following resources can help (listed alphabetically). This is not an exhaustive list, but does include excellent sources, many of which link to additional sites.

HEALTH PROFESSIONAL ASSOCIATIONS

American Academy of Family Physicians (AAFP)

www.familydoctor.org

The AAFP's "Family Doctor" site allows users to search AAFP's collection of health topics, including information on the immune system, vaccines, and vaccine-preventable diseases. This site also includes a directory in Spanish.

American Academy of Pediatrics (AAP)

www.aap.org

This site includes AAP policy statements (stored alphabetically for easy searching) that summarize AAP positions on various issues, including immunization issues. Sub-sections of the site of particular interest and value for those seeking information on immunization are shown below.

www.aap.org/family/parents/immunize.htm

This page links directly to the current immunization schedule.

www.aap.org/moc

AAP Members Only Channel. The AAP member's site contains detailed, clinical information for use by practitioners. It also contains speaking points and AAP member alerts on hot immunization topics in the news. In addition, AAP members will be automatically subscribed to the Members Only LISTSERV®' email list when registering for the AAP Members Only Channel.

www.aap.org/new/immpublic.htm

This page contains a compendium of immunization resources, as well as videos, photographs, brochures, and fact sheets on immunization. The site also offers a list of state immunization program managers and the current immunization schedule.

American Association of Immunologists (AAI)

http://12.17.12.70/aai/committees/education/hi qh.htm

The "Middle and High School Teaching Materials" page contains lessons and projects that teachers and health care providers can use to teach immunology topics.

http://12.17.12.70/aai/educating

This page, entitled "Educating the Public," has articles with advice for teachers and health care providers on teaching immunology topics.

American College Health Association (ACHA)

www.acha.org

The ACHA site outlines guidelines on meningococcal vaccine use in college settings, in addition to other vaccine entry requirements for incoming college students.

American College of Obstetricians and Gynecologist (ACOG)

www.acoq.org

This site contains publications that address immunization issues.

American College of Physicians American Society of Internal Medicine (ACP-ASIM)

www.acponline.org/aii

ACP-ASIM's Adult Immunization Initiative is a new project that is developing resources and tools to support members in their immunization efforts. The page now provides links to the archived "Immunization Booster" sections from the ACP-ASIM monthly newsletter, as well as immunization news.

American Medical Association (AMA)

www.ama-assn.org/ama/pub/category/1797.html

This section of the AMA site entitled "Resources on Infectious Disease" has feature articles on current infectious disease and immunization issues, and links to recently published journal articles. The page also provides general information on various topics related to infectious disease, including descriptions of AMA positions and lists of additional resources. Visitors can find specific immunization information in the "Vaccination Resources" section.

American Nurses Association (ANA)

www.nursingworld.org/mods/mod1/cechfull.htm

On this page, the ANA offers information on childhood immunization from its continuing education program. The program's objectives are to describe the history of childhood vaccinations in the United States; list current Advisory Committee for Immunization Practices (ACIP) recommendations for childhood immunizations; identify barriers to childhood immunizations; discuss interventions to eliminate barriers; and identify contraindications to childhood immunization delivery.

www.nursingworld.org/readroom/position/ social/scaltimm.htm

The ANA's position statement on adult immunization can be found on this page.

www.nursingworld.org/readroom/ position/social/scimmu.htm

The ANA's position statement on child immunization can be found on this page.

American Pharmaceutical Association (APhA)

www.aphanet.org/pharmcare/ImmunizationInformation.htm

The APhA "Immunization Information" page discusses current immunization issues, such as vaccine shortages and immunization reimbursement, from a pharmacist's perspective. The site provides immunization guidelines for pharmacists, and training information for pharmacists who wish to give immunizations. The site provides access to listserv reports, presentations, and other resources.

Association of Teachers of Preventative Medicine (ATPM)

www.atpm.org/education/education.htm

The ATPM site offers information on teaching the principles of immunization, and curricular materials for both doctors and nurses. The site's "Training" section lists continuing medical education (CME) opportunities in immunization when they are available.

Infectious Diseases Society of America (IDSA)

www.idsociety.org

This site provides a wealth of information on infectious disease topics, including practice guidelines and information about IDSA's networks on emerging infectious diseases and HIV/AIDS. Links are provided to publications such as IDSA's *Journal of Infectious Diseases* and *Clinical Infectious Diseases*, CDC's *Morbidity and Mortality Weekly Report*, and the World Health Organization's *Weekly Epidemiological Record*.

National Association of Pediatric Nurse Associates and Practitioners (NAPNAP)

www.napnap.org/immunization

This page offers NAPNAP's position statement on immunization.

National Medical Association (NMA)

www.nmanet.org

This site covers materials and programs designed to assist in discussing immunization with African-American audiences. Access these materials by clicking on "Immunization" under the "National Programs" tab that appears at the top of the main page.

Society of Teachers of Family Medicine (STFM), Group on Immunization Education (GIE)

www.immunizationed.org

This site designed for family medicine educators provides immunization standards, news, reports, and downloadable slide presentations. The site also links to current immunization schedules, photographs of vaccine-preventable diseases, and other sources of immunization information.

NON-PROFIT GROUPS AND UNIVERSITIES

Albert B. Sabin Vaccine Institute

www.sabin.org

The Sabin Institute site explains vaccine science, answering questions such as "What is a vaccine?" and "How does it work?" and describing new vaccine initiatives. The site has an archived list of *Sabin Vaccine Report* articles that cover a wide variety of immunization topics.

All Kids Count

www.allkidscount.org

This Web site provides information on immunization registries and their development. All Kids Count presents a basic explanation of registries and discusses related issues, such as privacy and funding. The site offers publications and online resources related to implementing registries, and links to other online immunization information sources.

Allied Vaccine Group (AVG)

www.vaccine.org

This site includes a group of Web sites dedicated to providing reliable information on vaccines and vaccinations. The site also provides vaccine and vaccination news.

Bill and Melinda Gates Children's Vaccine Program

www.childrensvaccine.org

The Children's Vaccine Program works to ensure that all children in the developing world receive the full benefits of vaccines without undue delay. This site provides both brief and indepth fact sheets on vaccine-preventable diseases, links to other credible organizations, and lists of upcoming conferences and meetings on vaccine issues.

Every Child By Two (ECBT)

www.ecbt.org

This site contains much information about the Every Child by Two early immunization campaign itself, but also has information for providers and content helpful to parents. This content includes a newsletter with current information on immunization issues, and an electronic version of CDC's *Parents Guide to Immunization*, which discusses individual vaccines and topics such as keeping immunization records.

Global Alliance for Vaccines and Immunization (GAVI)

www.vaccinealliance.org

This site offers background materials on vaccines and vaccine research, worldwide immunization news, and information on GAVI grants to developing countries.

Health on the Net Foundation (HON)

www.hon.ch

The Health on the Net (HON) Foundation site outlines a set of guidelines for evaluating and posting health information online. Sites which undergo the HON certification process are entitled to use the HON seal, showing that they abide by these guidelines. The site allows users to check whether a given Web site is HON-certified, and also contains an interactive questionnaire to help users gauge the credibility of information on sites that are not HON-certified. In addition, the site contains search engines designed to retrieve medical information, videos and photos of diseases and medical procedures, lists of health care conferences, and background on select health topics.

National Healthy Mothers, Healthy Babies Coalition (HMHB)

www.hmhb.org/parent.html#immunization

This page presents a series of questions and answers on immunization topics, including which vaccines should be administered prior to age two, the importance of vaccination health records, and where to obtain free vaccinations. HMHB also provides links to other immunization resources on the Web.

Immunization Action Coalition (IAC)

www.immunize.org

This site is most suited for health professionals, but many aspects of it will be informative for parents. For example, it includes sections that summarize the effects of vaccine-preventable diseases, including personal accounts of people who have been affected by them. Visitors can view photos of people with vaccine-preventable diseases and review state immunization mandates. A listserv called *IAC Express* is available on the site, which provides regular notices about current immunization topics. In addition, the site provides CDC's Vaccine Information Statements in 26 languages, including English.

Institute for Vaccine Safety Johns Hopkins University (IVS)

www.vaccinesafety.edu

This Web site was established as a forum to disseminate information and commentary on vaccine safety issues. Updates on current issues related to immunization are posted. The site includes information on vaccines and the diseases they prevent, a table that summarizes the thimerosal content in some vaccines, and links to other Web sites which offer information on relevant issues.

Institute of Medicine (IOM)

www.iom.edu/IOM/IOMHome.nsf/Pages/immu nization+safety+review

This IOM page describes the ongoing Immunization Safety Review study, which has released a report on the MMR vaccine and autism, and is currently reviewing the issue of thimerosal in vaccines. The site posts upcoming meetings and reports.

Medem

www.medem.com/MedLB/sub_detaillb.cfm?par ent_id=274&act=disp

Medem is a partnership of almost 40 medical societies to present comprehensive and trusted health information on the Internet. The Medem site features a medical library of health information, including information on infectious diseases and immunization.

National Alliance for Hispanic Health

www.hispanichealth.org/cat1.htm

This page offers memos in English and Spanish, designed for a general audience, which give background information and explain why adults and adolescents should receive immunizations. A memo in English on immunization outreach strategies to reach Hispanic populations is also provided. Other immunization resources in Spanish and English, such as videos and booklets, are available for sale.

National Foundation for Infectious Diseases' (NFID) National Coalition for Adult Immunization (NCAI)

www.nfid.org/ncai

This site focuses on immunization issues for adults. Numerous fact sheets are available, including general vaccine topics and specific information about each available vaccine as it relates to adults. Adult and adolescent immunization schedules are shown.

National Network for Immunization Information (NNii)

www.immunizationinfo.org

The NNii Web site is designed to provide health care professionals, the media, policy makers, and the public with up-to-date, science-based information on immunizations. The site features a searchable database of information on diseases prevented through immunization, a listing of all state vaccination requirements, and thrice-weekly Immunization Newsbriefs, which highlight vaccine issues in the news. It also includes background on vaccine development and vaccine safety, guidelines for how to evaluate health information on the Internet, and an image gallery of the effects of vaccine-preventable diseases. The NNii Resource Kit, Communicating With Patients About Immunization, is also available here in downloadable PDF format.

National Partnership for Immunization (NPI)

www.partnersforimmunization.org

NPI is a joint program of the National Healthy Mothers, Healthy Babies Coalition and the National Foundation for Infectious Diseases. Its Web site provides both general background information and links to additional resources on a wide range of immunization topics, including individual vaccines, vaccine safety, registries, immunization schedules, and special requirements. NPI's listserv VAXfacts is available on the site and provides monthly immunization news updates. The NPI Reference Guide on Vaccines and Vaccine Safety and the National Immunization Awareness Month Promotional Kit are also available in a downloadable PDF format.

Parents of Kids with Infectious Diseases (PKIDS)

www.pkids.org

This site pulls together a variety of immunization information, ranging from official statements and congressional testimony to letters in support of immunization from celebrities. The "Immunization" section also includes articles, Q & A, hepatitis B posters in many languages, U.S. state immunization rates by percentage, information on vaccine storage and handling, and links to other sources. The site also offers an "Ask the Experts" feature that allows users to e-mail immunization questions to five experts.

The Vaccine Page

www.vaccines.com

This site functions largely as a hub, connecting visitors to many other sites, including sites for parents and practitioners. The Vaccine Page links to medical journal sites and the sites of associations and advocacy groups, as well as to vaccine and immunization-related issues that appear on wire services. (Note: While the Vaccine Page provides access to sites with scientifically accurate information, some links contain on-line "chat rooms" where parents may encounter information that is not based on the best available science.)

Vaccine Education Center at the Children's Hospital of Philadelphia

www.vaccine.chop.edu

This site aims to provide complete, up-to-date, and reliable information about vaccines to parents and health care professionals. It includes information on how vaccines work, how they are made, who recommends vaccines, when they should be given, why they are still necessary, and how vaccine safety is maintained. It includes extensive background on every major vaccine and the disease or diseases it prevents. Additionally, educational materials, including informational tear sheets and a video entitled "Vaccines: Separating Fact from Fear" can be ordered. Health care professionals can request a small number of these items without cost.

DISEASE-SPECIFIC INFORMATION

American Lyme Disease Foundation (ALDF)

www.aldf.com

The ALDF site presents general background information on the Lyme disease vaccine, Lyme disease news, and links to additional information.

Hepatitis B Foundation (HBF)

www.hepb.org

This site provides fact sheets on risk factors for hepatitis B transmission and information on the hepatitis B vaccine.

Hepatitis Foundation International (HFI)

www.hepfi.org

This site provides information on hepatitis A, B, and C, including the hepatitis A and B vaccines.

Hepatitis Foundation International Hotline

HFI also offers a toll-free number to call for answers to further questions on hepatitis, 1-800-891-0707.

Meningitis Foundation of America (MFA)

www.musa.org

MFA describes the different varieties of meningitis, provides answers to frequently asked questions, and posts articles and reports. Information on the meningococcal, pneumococcal, and Hib vaccines, and a description of new vaccines against meningitis on the horizon, appear under "Prevention." (Note: MFA provides an on-line "chat room" where parents may encounter information that is not based on the best available science.)

Varicella-Zoster Virus Research Foundation (VZVRF)

www.vzvfoundation.org

This site addresses questions pertaining to varicella-zoster virus infections, including chickenpox, shingles, and post-herpetic neuralgia (PHN). It also discusses the chickenpox vaccine.

GOVERNMENT ORGANIZATIONS

Association of State and Territorial Health Officials (ASTHO)

www.astho.org/state.html

This site provides information about individual state immunization programs and contact information for state health departments.

Centers for Disease Control and Prevention (CDC)

www.cdc.gov

From CDC's home page, visitors can search health issues using an alphabetical menu. Sub-sections of the site of particular interest and value for those seeking information on immunization are shown below.

http://phil.cdc.gov/phil/default.asp

This site allows users to search for and view images on vaccines and vaccine-preventable diseases. Images include photographs of infected individuals, infectious disease-causing bacteria or viruses, and historical immunization scenes. The Library also has slides with infectious disease information for use in presentations.

www.cdc.gov/travel/vaccinat.htm

This site features immunization updates for travelers. It also links to a database that users can search to find immunization and other health recommendations for specific areas of the world.

National Center for Infectious Diseases (NCID)

www.cdc.gov/ncidod

This site provides in depth information on infectious diseases, including vaccine-preventable infectious diseases, through the site's searchable "Infectious Disease Index." The site also links to an online hepatitis C training for health care providers.

National Immunization Program (NIP)

www.cdc.gov/nip

NIP's home page features publications that answer the question "Why Immunize?" as well as links to important immunization topics in the news.

www.cdc.gov/nip/publications

This section of NIP's site features publications and fact sheets designed for the public on many issues such as "6 Misconceptions about Vaccination" and answers to frequently asked questions. Also provided are the recommendations of the Advisory Committee on Immunization Practices (ACIP) and downloadable Vaccine Information Statements (VISs). (To order VISs by phone, call CDC's Immunization Information Hotline at 1-800-232-2522.)

www.cdc.gov/nip/vacsafe

This section of NIP's site focuses on vaccine safety and provides information on current vaccine-related issues, a glossary, an explanation of the risks of diseases as compared to immunization risks, and instructions for reporting an adverse vaccine reaction to the Vaccine Adverse Event Reporting System (VAERS).

National Vaccine Program Office (NVPO)

www.cdc.gov/od/nvpo

This site is posted by the federal National Vaccine Program Office, which was created to bring together all of the groups that have key roles in immunization, including federal, state, and local agencies, the public, health care providers, and private-sector entities such as vaccine manufacturers. The site provides basic information about immunization concepts (like how the immune system works). It also provides "Ten Tips for Evaluating Information on the Internet," and includes links to other organizations that provide vaccine information.

CDC International Traveler's Line

The CDC International Traveler's Line, 1-877-FYI-TRIP or 1-877-394-8747, answers questions on travel health issues.

CDC National Immunization Information Hotline

For those without Internet access or those who would like to speak with someone in person, CDC's National Immunization Information Hotline can be reached at 1-800-232-2522 (for Spanish speakers, the number is 1-800-232-0233).

ClinicalTrials.gov

www.clinicaltrials.gov/ct/qui

This site features a search engine that allows users to enter "vaccine" or specific diseases to find descriptions of current vaccine studies underway.

Food and Drug Administration's (FDA) Center for Biologics Evaluation and Research (CBER)

www.fda.gov/cber

FDA's CBER home page features links to current vaccine information, including vaccine recalls. Some information ranges beyond vaccines, so two subsections of the site especially suited to those seeking vaccine information are shown below.

www.fda.gov/fdac/features/095_vacc.html

This article addresses topics including clinical trials, advisory committees, licensure, and continuing studies.

Vaccine Adverse Events Reporting System (VAERS)

www.fda.gov/cber/vaers/vaers.htm

This portion of the FDA's site answers questions about what the Vaccine Adverse Event Reporting System (VAERS) is, why it exists, how it works, and what can and cannot be inferred from VAERS data. Links for general immunization information (e.g., CDC's NIP) and information on vaccine safety (e.g., FDA, AAP) are included. To report an adverse event, call 1-800-822-7967.

FDA Consumer Information Hotline

CBER maintains a consumer information hotline to answer questions about vaccine safety and regulations, 1-800-835-4709.

Health Resources and Services Administration's (HRSA) National Vaccine Injury Compensation Program (VICP)

www.hrsa.gov/bhpr/vicp

HRSA's site on the Vaccine Injury Compensation Program (VICP) explains what the VICP is, how it was created, and how to file a claim. In addition, the site offers a summary of current issues, answers to frequently asked questions, a monthly statistics report, and other information.

National Vaccine Injury Compensation Program Public Information Line

For information about the VICP health professionals and their patients can call the public information line at 1-800-338-2382.

Medlineplus

www.nlm.nih.gov/medlineplus/childhoodimmu nization.html

This Medlineplus site is a compilation of government and other immunization resources on childhood immunizations. The site includes some articles in Spanish.

Minnesota Department of Health (MDH)

www.health.state.mn.us/divs/dpc/adps/forgnvac.htm

This page links to tables that present international information on vaccines and vaccine-preventable diseases. The "Vaccines and Biologics Used in the U.S. and Foreign Markets" chart can help health care providers determine which immunizations their patients may have received in other countries. The chart lists the product or trade name, its antigen, and the country in which the product is offered. The manufacturing company is also listed for some products. The "Translation of Foreign Vaccine-related Terms" chart translates frequently used words and expressions related to vaccines and vaccine-preventable diseases from various foreign languages to English.

www.health.state.mn.us/divs/dpc/adps/immigran.htm

This page discusses topics of concern for physicians of patients who have received vaccines outside the U.S., including viability of the vaccine, adequate documentation, and the immunization schedule used.

National Institute of Allergy and Infectious Diseases (NIAID)

www.niaid.nih.gov/dmid/vaccines

This NIAID page provides fact sheets on vaccines and the immune system. The page also offers updates on vaccine research and vaccine safety, including *The Jordan Report*, an annual report on the state of vaccine research.

Pan American Health Organization (PAHO)

www.paho.org/Selection.asp?SEL=TP&LNG=ENG&CD=DISVACIMUN

The PAHO "Vaccines and Immunization" page offers background information and fact sheets on immunization, presented with an international perspective. Some articles are only available in Spanish.

U.S. Military Immunization Information Source

www.tricare.osd.mil/immunization

This site contains current immunization program information for the U.S. Department of Defense and the Military Services.

World Health Organization (WHO)

www.who.int/vaccines

This site's section on vaccine safety educates visitors on current immunization issues and how vaccines are developed and distributed. It displays immunization statistics, maps, and charts. The site also describes the Global Alliance for Vaccines and Immunization (GAVI). WHO's perspective is global and site contents also are available in Spanish and French.